

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

1/25

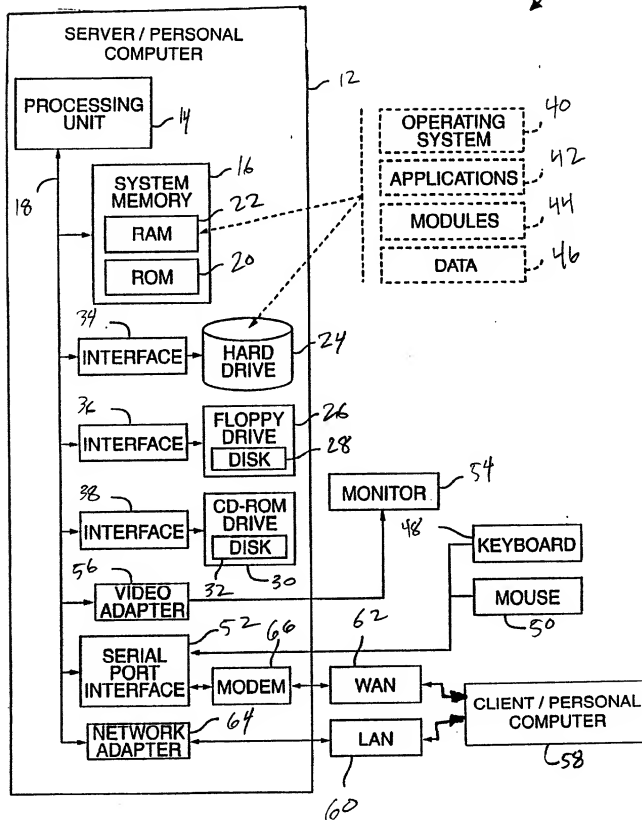


Figure 1

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

2/25

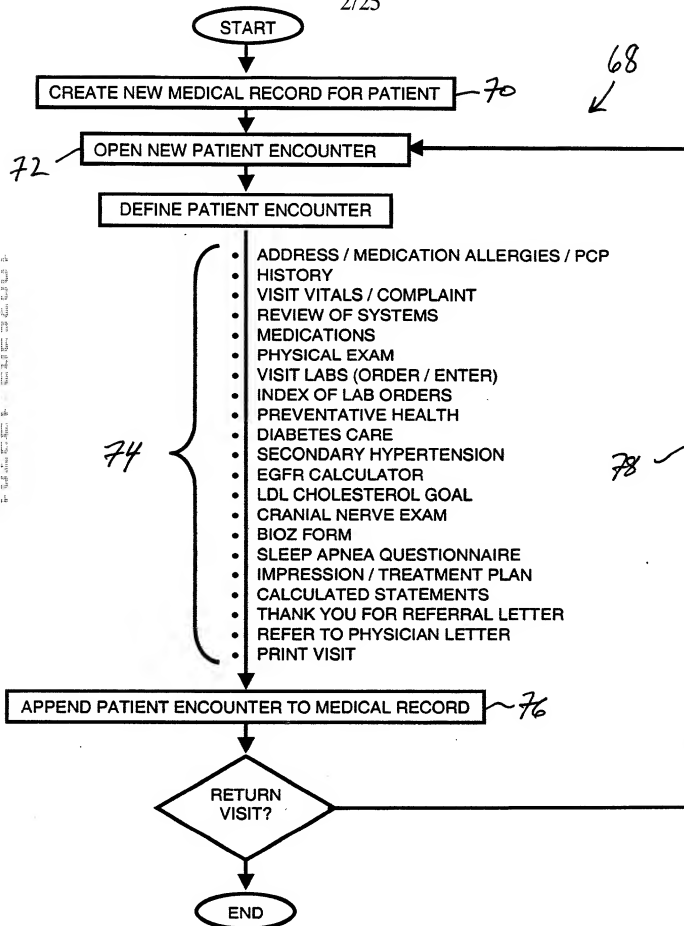


Figure 2

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: **John M. Flack**

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

3/25

Microsoft Access

File Edit Insert Records Window Utilities Add To List Medication Table Treatment Algorithms View Summary Help

Patient Information

☒ Expired ☐ Chronic No Show

Patient Demographics | **Referring / Primary Physician Information**

Last Name: 82
 First Name: MI: 84
 DOB:
 Gender:
 Race: 88
 Address: 90
 City, State, Zip:
 Home Phone: Wk: 92
 Email Address:

Medical Record Number:
 Social Security Number:

Please select the physicians this patient will or is currently seeing in this clinic:

Clinic Physician:

☒ Flack, John M.

Comments:

Drug Allergies:

Medication Allergies:

☒ Sulta Medication
☐ Sulta Medication
☐ sulfamethazole
☐ Sulindac/Clinoril
☐ SuperEPA Softgels
☐ Suprax
☐ Surfak / Docusate Calcium
☐ Sumonil
☐ Surventa 98

94

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

4/25

Patient Encounter Summary

Patient: Doe, John SSN: 123-12-1234 Close

New Visit / Encounter to Add: Select Lab Visit:

View Encounter Type	Contact Date	Address / Medication Allergies / PCP
<input type="checkbox"/> Initial Visit	01/03/1999	BioZ Form
(most current visit listed first):		Calculated Statements
<input type="checkbox"/> Telephone	12/12/2000	Cranial Nerve Exam
<input checked="" type="checkbox"/> Return	11/02/2000	Diabetes Care
<input type="checkbox"/> Telephone	10/16/2000	EGFR Calculator
<input type="checkbox"/> Telephone	10/09/2000	History
<input type="checkbox"/> Telephone	10/07/2000	Impression / Treatment Plan
<input type="checkbox"/> Emergency Room	09/26/2000	Index of Lab Orders
<input type="checkbox"/> Telephone	09/10/2000	LDL Cholesterol Goal
<input type="checkbox"/> Telephone	06/24/2000	Medications
<input type="checkbox"/> Telephone	06/23/2000	Physical Exam
<input type="checkbox"/> Return	01/21/2000	Preventive Health
<input type="checkbox"/> Nurse	01/17/2000	Refer To Physician Letter
<input type="checkbox"/> Discharge	12/21/1999	Review of Systems
		Secondary Hypertension
		Sleep Apnea Questionnaire
		Thank You for Referral Letter
		Visit Labs (Order / Enter)
		Visit Vitals / Complaint
		Print Visit
		Delete Visit

Fig. 4

102

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

5/25

MedTrace

File Edit Insert Records Window Add To List Medication Table Treatment Algorithms View Summary Help

89 Patient History Form

Patient Name: John Doe

SSN: 123-12-1234

Unlock/Edit History Outline Changed Fields Close

Blood Pressure Cardiovascular / Renal Family / Personal History Non-Drug Allergies

Yes ☒ Hypertension

Hypertension Diagnosis Date: [non-formatted date field]

Duration of hypertension: years

Highest known systolic blood pressure: mm Hg

Highest known diastolic blood pressure: mm Hg

ER visits for hypertension:

Last ER visit for hypertension: [non-formatted date field]

hospitalizations for HTN:

Last hospitalization for hypertension: [non-formatted date field]

How many times per week do you forget to take your BP medication:

120 122 124 116 126 118

128

112 ↗

Fig. 5

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

6/25

Initial Visit Form [Comprehensive]

Patient: Doe, John Close

SSN: 123-12-1234

Date of Visit: 01/03/1999

Presenting Complaint Problem List Visit Vitals 134 144

Problem(s): Select from drop-down list choices here or use "Check Sheet" Check Sheet

Problems:	Comments:	Yes=Resolved, No=Continues:
Hypertension		
Dyspnea on Exertion	T block, probable cause emphysema	
Asthma		
*		

Other Problems: Enter free text in this section for problems not available above:

Problems (free text):	Comments:	Yes=Resolved, No=Continues:
Mid global dysfunction; EF 45-50%		
Valvular heart disease; mild AI, MR,		
Severe annular mitral calcification		
Ascites		
ant. mitral valve prolapse		

Fig. 6

130

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

7/25

Initial Visit Form (Comprehensive)

Patient: Doe, John

SSN: 123-12-1234

Close

Date of Visit: 01/03/1999

Presenting Complaint | Problem List | Visit Vitals

148 { Height(in): 59 Weight(lbs): 166.5 BMI (kg/m2): 24.6 Pulse(bpm): 74 ☒ Regular
Resp/min: 18 Temp(F): 99 ☐ Irregular
Cuff to be used for visit BP: large adult Arm to be used for visit BP: Right

150 {

Seated Blood Pressures:			Standing Blood Pressures:		
Systolic	Diastolic	Arm	Systolic	Diastolic	Arm
156	90	Left	144	88	Right
160	96	Right			

BP Summary ☐ Open BP Trend Graph
152 154 156
Left Arm Right Arm

Fig. 7

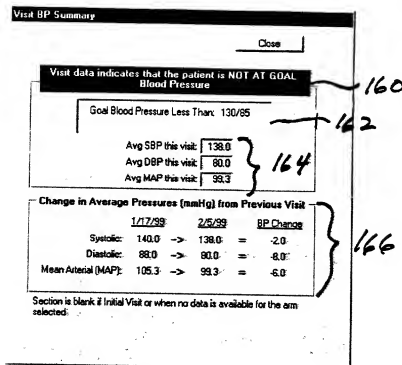
146

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

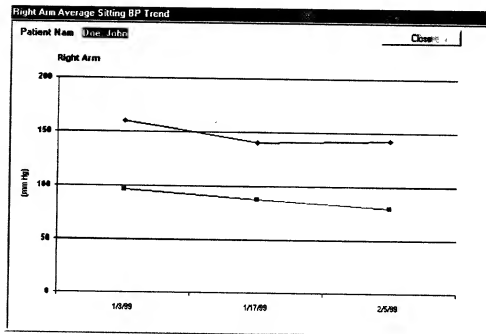
Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

8/25



158 ↗

Fig. 8



168 ↗

Fig. 9

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

9/25

172 {

175 {

170 →

Review of Systems

Patient: Doe, John
SSN: 123-12-1234

Unlock/Edit Form Close

Review Date: 01/03/1999 This Form is Currently Unlocked

Neurological	Endocrine	Hematologic/Lymphatic	Allergic/Immunologic	Psychiatric	Reproductive			
Constitutional	Eyes	ENT	Respiratory	GI	Genitourinary	Psychosocial	Musculoskeletal	Integumentary

Positive - 174

Constitutional

Finding	Comment (free text)
Exercise intolerance	Out of breath after walking short distance

Fig. 10

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

10/25

Medications Form

Patient: Doe, John
SSN: 123-12-1234

190 Open Medication Summary Print Prescriptions 184 Close

Medication	Dose	Units	Freq	Prior V1	Start Date	Stop Date	Cont	#Refills	#Pills/Vials
Nephrocaps	1QD	Yes	01/01/1996	Yes					
Comment: He is unsure of dose									
Accupril / Quinapril	10	mg	BID	Yes	05/15/1998		Yes	5	66
ACE inhibitor									
Acebutolol / Sektal					11/08/2000		Yes		
Aceon Tablets									
Acetaminophen									
Achromycin									
Aciphex / Rabeprazole Sodium									
Acro-Lase									

178

182

180

184

188

Combination Medication Entry Tool: Enter combination medication info. and click the Append to Medication List button.

Combination Medication: Frequency: Start Date: Stop Date: Cont: Prior V1: Append to Patient Medication List

(required) (required)

176

Fig. 11

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

11/25

Physical Impression and Plan

Patient: Doe, John
SSN: 123-12-1234
Date: 01/03/1999

Close

General HEENT Neck Lung Heart Musculoskeletal Abdomen Neuro Breasts Skin Extremities Rectal

Abnormal 198

Abnormal Lung Findings: 200

- * Dullness to percussion
 - rates L>R
 - rates R>L
 - rates- basilar
 - rates- equal R and L
- rhonchi
- wheeze- bilateral
- wheeze- end-inspiratory

Other Lung Findings (free text):

- * involves one-quarter posterior lung fields bilaterally

192

Fig. 12

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

12/25

Visit Lab Orders

Patient: Doe, John
 SSN: 123-12-1234
 Date of Visit: 01/03/1999

Close
 Open Lab Visit for this Order

Current Lab Orders:

Lab Orders
Urine Albumin
Crea (Serum)
24hr Blood Pressure Monitor

Check Sheet:

Cancel Order	Order Checked Labs
<input type="checkbox"/> CBC	
<input type="checkbox"/> Cholesterol	
<input type="checkbox"/> CK	
<input type="checkbox"/> CPK	
<input checked="" type="checkbox"/> Crea (Serum)	
<input type="checkbox"/> CT scan-Head	
<input type="checkbox"/> Dietary: 1800 ADA Diet	
<input type="checkbox"/> Dietary: 2 gram sodium diet	
<input type="checkbox"/> Dietary: 2000 ADA Diet	
<input type="checkbox"/> Dietary: 2200 ADA Diet	
<input type="checkbox"/> Dietary: Low cholesterol diet	

206

Fig. 13

Lab Form

Patient: Doe, John
 SSN: 123-12-1234
 Date: 01/03/1999

Delete Print Close

Blood Results | Urine Results | Renal Artery Duplex Scan | Echocardiogram

BLOOD TEST RESULTS

	Reference Ranges	Calculated Diagnoses/Comments
Fasting: <input type="checkbox"/> Yes		
Sodium: <input type="checkbox"/> (mmol/L)	135 - 145	
Potassium: <input type="checkbox"/> (mmol/L)	3.5 - 5.3	
Chloride: <input type="checkbox"/> (mmol/L)	95 - 110	
Carbon Dioxide: <input type="checkbox"/> (mmol/L)	20.0 - 30.0	
BUN: <input type="checkbox"/> (mg/dL)	7 - 20	
Creatinine: 1.2 (mg/dL)	0.6 - 1.2	EGFR: 53.0
Glucose: 110 (mg/dL)	70 - 110	(110-125= Impaired Fasting Glucose)
BUN / Crea ratio: <input type="checkbox"/>	7 - 20	
Anion Gap: <input type="checkbox"/> (mmol/L)	5 - 20	
Bilirubin, Direct: <input type="checkbox"/> (mg/dL)	0.0 - 0.4	
Bilirubin, Indirect: <input type="checkbox"/> (mg/dL)	0.0 - 0.8	
Calcium: <input type="checkbox"/> (mg/dL)	8.2 - 10.6	

216

Fig. 14

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.:

/ Atty. Docket No.: MTS 0102 PUS

13/25

lab_orders_index : Form

Order Date: 01/03/1999

Delete This Order

Close

Ordering Physician: Flack, John M.

Order Lab Tests From Sheet

Labs Available

Open Lab Visit for this Order

Test(s) Ordered:	Status:	ReOrder Date:
Urine Albumin	<input checked="" type="checkbox"/> Done <input type="checkbox"/> Not Done	
Crea (Serum)	<input checked="" type="checkbox"/> Done <input type="checkbox"/> Not Done	
24hr Blood Pressure Monitor	<input checked="" type="checkbox"/> Done <input type="checkbox"/> Not Done	
Lipid Profile	<input checked="" type="checkbox"/> Done <input type="checkbox"/> Not Done	
	<input checked="" type="checkbox"/> Done <input type="checkbox"/> Not Done	

Record: 1 of 1

Fig.15

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

14/25

Secondary HTN

Patient: Doe, John Close

SSN: 123-12-1234

Renovascular Hypertension | Hyperaldosteronism | Pheochromocytoma | Cushing's Syndrome | Hypothyroidism / Hypothyroidism

Renovascular Test:	Test Date:	Diagnosis:	Diag Date:	Actions Taken / Findings:
▶ Captopril Renogram	-	-	-	-
		Location:	-	-
*	-	-	-	-
		Location:	-	-

Lab Date: 01/03/1999

Right Kidney:	Left Kidney:
PSV RRA Origin: <input type="text"/> (<180 cm/sec)	PSV LRA Origin: <input type="text"/> (<180 cm/sec)
PSV RRA Mid: <input type="text"/> (<180 cm/sec)	PSV LRA Mid: <input type="text"/> (<180 cm/sec)
PSV RRA Distal: <input type="text"/> (<180 cm/sec)	PSV LRA Distal: <input type="text"/> (<180 cm/sec)
RT Renal / Aortic Ratio: <input type="text"/> (<3.5)	LT Renal / Aortic Ratio: <input type="text"/> (<3.5)
Right Kidney:	Left Kidney:

Record: 1 of 2

228 ↗

Fig. 16

15/25

EGFR Calculator

Patient: Doe, John Close

SSN: 123-12-1234

Always verify that the information below is accurate!

236 {

Age: (yr)

Sex: -

Height: (in)

Weight: (lb)

Serum Creatinine: (mg/dl)

EGFR: 39.3

Note: Although the data imported is from the patient record, field changes made on this form are NOT stored in the patient record.

Fig. 17

LDL Cholesterol Goal

Patient: Doe, John Close

SSN: 123-12-1234

Always verify that the information below is accurate!

Goal LDL: Less than or equal to 100 mg/dl

240 {

Age:

Sex: -

Family Hx of CHD: -

Smoking: -

Hypertension: -

CHD: -

Diabetes: -

HDL: mg/dl

LDL: mg/dl

*required field if CHD is "No!"

LDL / HDL Lab Results Summary:

DATE	FASTING	LDL	HDL
01/03/1999	Yes	150	60

238

Fig. 18

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

16/25

Impression / Treatment Plan														
Patient: Doe, John SSN: 123-12-1234 Visit Date: 1/3/99	Lab Orders <input type="checkbox"/> Urine Albumin <input type="checkbox"/> Creatinine (Serum) <input type="checkbox"/> 24hr Blood Pressure Monitor	Close <input type="button" value="Order Lab Tests From Sheet"/> <input type="button" value="Open Calculated Statements"/>												
Impression / Treatment Plan														
Impression: Gentleman with ESRD on peritoneal dialysis with HTN of unknown duration. His symptoms of dyspnea on moderate exertion point to the need to screen for systolic and diastolic heart dysfunction and, if systolic dysfunction is present, to consider combined hypertensive and ischemic cardiomyopathy. I suspect that he has some peripheral arterial disease and mild claudication symptoms. He is currently impotent, a problem likely secondary to his hypertension and radiation treatment for prostate cancer. Atherosclerosis also may be playing a role in his impotence. His cerebellar dysmetria is possibly linked to remote ETOH intake. Some of his breathlessness also may relate to primary pulmonary disease. Combined systolic and diastolic hypertension in a significantly overweight patient.														
Other Visit Impression(s) for Patient: <input type="button" value="Preformatted Statements (A)"/> <input type="button" value="Preformatted Statements (B)"/> <input type="button" value="Preformatted Statements (C)"/>														
<table border="1"> <tbody> <tr> <td>Blood pressure elevation in a significantly overweight person who is not currently adhering to any lifestyle modifications and also discussed the long-term need for blood pressure medication if pressure levels do not come down.</td> <td><input type="checkbox"/></td> </tr> <tr> <td>Combined systolic and diastolic hypertension in a significantly overweight patient.</td> <td><input type="checkbox"/></td> </tr> <tr> <td>Consider possible sleep apnea, since patient is overweight and also gives Hx of snoring at night.</td> <td><input type="checkbox"/></td> </tr> <tr> <td>Diet is likely a problem by the patient's own admission.</td> <td><input type="checkbox"/></td> </tr> <tr> <td>Excellent blood pressure control, patient is at goal.</td> <td><input type="checkbox"/></td> </tr> <tr> <td>Excellent blood pressure response, however still above goal. Patient has seen a dietitian and is on a low-fat, low-salt diet.</td> <td><input type="checkbox"/></td> </tr> </tbody> </table>			Blood pressure elevation in a significantly overweight person who is not currently adhering to any lifestyle modifications and also discussed the long-term need for blood pressure medication if pressure levels do not come down.	<input type="checkbox"/>	Combined systolic and diastolic hypertension in a significantly overweight patient.	<input type="checkbox"/>	Consider possible sleep apnea, since patient is overweight and also gives Hx of snoring at night.	<input type="checkbox"/>	Diet is likely a problem by the patient's own admission.	<input type="checkbox"/>	Excellent blood pressure control, patient is at goal.	<input type="checkbox"/>	Excellent blood pressure response, however still above goal. Patient has seen a dietitian and is on a low-fat, low-salt diet.	<input type="checkbox"/>
Blood pressure elevation in a significantly overweight person who is not currently adhering to any lifestyle modifications and also discussed the long-term need for blood pressure medication if pressure levels do not come down.	<input type="checkbox"/>													
Combined systolic and diastolic hypertension in a significantly overweight patient.	<input type="checkbox"/>													
Consider possible sleep apnea, since patient is overweight and also gives Hx of snoring at night.	<input type="checkbox"/>													
Diet is likely a problem by the patient's own admission.	<input type="checkbox"/>													
Excellent blood pressure control, patient is at goal.	<input type="checkbox"/>													
Excellent blood pressure response, however still above goal. Patient has seen a dietitian and is on a low-fat, low-salt diet.	<input type="checkbox"/>													

242

Fig. 19

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

17/25

Impression / Treatment Plan																				
Patient: Doe, John SSN: 123-12-1234 Visit Date: 1/3/99	Lab Orders <input checked="" type="checkbox"/> Urine Albumin <input type="checkbox"/> Creat (Serum) <input type="checkbox"/> 24hr Blood Pressure Monitor	Close <input type="button" value="Order Lab Tests From Sheet"/> <input type="button" value="Open Calculated Statements"/>																		
Impression Treatment Plan																				
Treatment Plan: Renal artery duplex scan, stress echocardiogram, start Norvasc 2.5 mg Q day, EKG, and review his labs and serum TSH. Will consider treatment with Viagra for his impotence if he does not have easily induced coronary ischemia on stress echocardiography.																				
Other Visit Treatment Plan(s) for Patient <input type="button" value="Preformatted Statements (A)"/> <input type="button" value="Preformatted Statements (B)"/> <input type="button" value="Preformatted Statements (C)"/>																				
<table border="1"> <tbody> <tr> <td>Return to clinic in 2-3 weeks.</td> <td><input type="button" value="OK"/></td> <td><input type="button" value="Cancel"/></td> </tr> <tr> <td>Return to clinic in 3 months.</td> <td><input type="button" value="OK"/></td> <td><input type="button" value="Cancel"/></td> </tr> <tr> <td>Return to clinic in 4-6 months.</td> <td><input type="button" value="OK"/></td> <td><input type="button" value="Cancel"/></td> </tr> <tr> <td>Return to clinic in 4-6 weeks.</td> <td><input type="button" value="OK"/></td> <td><input type="button" value="Cancel"/></td> </tr> <tr> <td>The patient is being referred to the dietitian for a 2 gram sodium, low-fat, low-cholesterol diet.</td> <td><input type="button" value="OK"/></td> <td><input type="button" value="Cancel"/></td> </tr> <tr> <td>Will check hem. BUN and creatinine on return.</td> <td><input type="button" value="OK"/></td> <td><input type="button" value="Cancel"/></td> </tr> </tbody> </table>			Return to clinic in 2-3 weeks.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>	Return to clinic in 3 months.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>	Return to clinic in 4-6 months.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>	Return to clinic in 4-6 weeks.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>	The patient is being referred to the dietitian for a 2 gram sodium, low-fat, low-cholesterol diet.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>	Will check hem. BUN and creatinine on return.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>
Return to clinic in 2-3 weeks.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>																		
Return to clinic in 3 months.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>																		
Return to clinic in 4-6 months.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>																		
Return to clinic in 4-6 weeks.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>																		
The patient is being referred to the dietitian for a 2 gram sodium, low-fat, low-cholesterol diet.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>																		
Will check hem. BUN and creatinine on return.	<input type="button" value="OK"/>	<input type="button" value="Cancel"/>																		

Fig. 20

254


Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

18/25

Diagnostic subform

 **Calculated Statements** Close

Meets criteria for HTN based on diabetes, CHF, CRI and SBP at least 130 or DBP at least 95 or on antihypertensive meds

It is prudent to wait ~4 to 6 weeks prior to starting antihypertensive medications to maximize BP lowering and to minimize drug related side effects.

Meets criteria for impaired fasting glucose based on lab results

For patients with ED: 1) if hypertensive, avoid thiazide diuretics, beta blockers (particularly older ones), and central adrenergic inhibitors. Favor use of alpha blockers. 2) Consider sildenafil (Viagra).

Preventive: Patients 50 years and older should have colonoscopy if primary relative has colorectal cancer and every 5 years after 2 negative exams.

Preventive: Patients 40 years and older should have stool checked for occult blood

Due to history of sulfa drug allergy, avoid thiazide diuretics or use them with caution.

Due to history of CHF, avoid use of thiazolidinediones and metformin.

In asthmatics with ASA sensitivity, non-acetylated salicylates (Trilisate, Orasol, etc.) are less likely to cause severe bronchospasm & anaphylactoid reactions. However, these reactions may occur with any NSAID.

258

256

Fig. 21

19/25

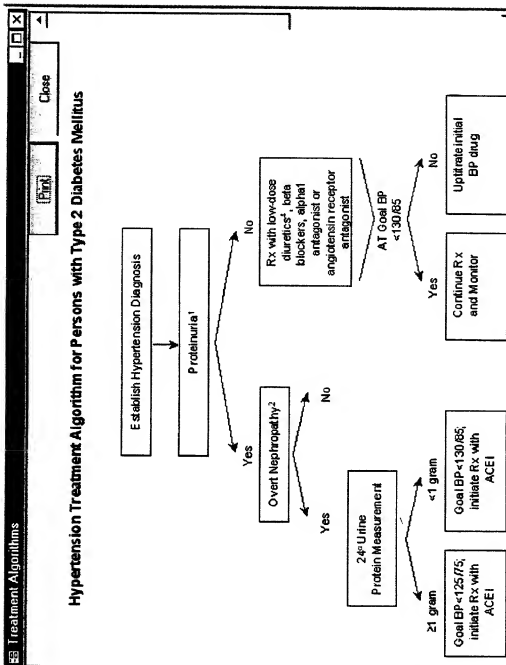


Fig. 22

257

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

20/25

Possible Allergic Reaction [Close]

THERE MAY BE POTENTIAL ALLERGIES TO THE FOLLOWING
CURRENTLY PRESCRIBED MEDICATION(S)

HCTZ

Allergy category:
Anti Antibiotic

Recommendation [Close]

It is prudent to wait ~4 to 6 weeks prior to titrating antihypertensive medications to maximize BP lowering and to minimize drug-related side effects.

257

259

Fig. 23

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

21/25

Referral Letter Form

Wayne State University
Internal Medicine

RE: DOE, JOHN A.
Med Rec#: 123-12-1234

November 15, 2000

REFERRING PHYSICIAN INFORMATION

First Name: John Address1: 4201 St Antoine, Suite 7A
MI: A Address2: University Health Center
Last Name: Salameer City: Detroit
Degrees: MD State: MI
Phone: (313) 745-8000 Zip: 48201
Fax: (313) 745-5545 Comments:
Email: jsalameer@intmed.wayne.edu

Dear Dr. Salameer,

Please print name and address for your kind and return of John Doe DOB: 05/01/24. He is a physician. Attached is a copy of my clinic note.

IMPRESSION:

gentleman with ESRD on peritoneal dialysis with HTN of unknown duration. His symptoms of dyspnea on moderate exertion point to the need to screen for systolic and diastolic heart dysfunction and, if systolic dysfunction is present, to consider combined hypertensive and ischemic cardiomyopathy. I suspect that he has some peripheral arterial disease and mild claudication symptoms. He is currently impotent, a problem likely secondary to the hypertension and radiation treatment for prostate cancer. Atherosclerosis also may be playing a role in his impotence. His cerebellar dysmetria is possibly linked to remote ETOH intake. Some of the breathlessness also may relate to primary pulmonary disease.

PROBLEMS

Problem	Comments	Resolved
<input checked="" type="checkbox"/> Hypertension		<input checked="" type="checkbox"/>
<input type="checkbox"/> LVH		<input type="checkbox"/>
<input type="checkbox"/> Pulmonary Hypertension		<input type="checkbox"/>
<input type="checkbox"/> End Stage Renal Disease (ESRD)		<input type="checkbox"/>
<input type="checkbox"/> Dyspnea on Exertion	*1 block, probable cause emphysema	<input type="checkbox"/>

ADDITIONAL PROBLEMS

Problem	Comments	Resolved
<input checked="" type="checkbox"/> Mild global dysfunction; EF 45-50%		<input checked="" type="checkbox"/>
<input type="checkbox"/> Vascular heart disease; mild A; MVR		<input type="checkbox"/>

260

Fig. 24

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

22/25

Referral Letter Form									
Wayne State University Internal Medicine				RE: DOE, JOHN A. Med Rec#: 123-12-1234		Print Letter		Close	
November 14, 2000									
Physician Directory: <input type="text"/>				Append Selected Physician					
REFER TO:									
Physician Name: <input type="text"/> Fredrick <input type="text"/> M <input type="text"/> Smith <input type="text"/> MD									
Address 1: <input type="text"/> 123 3rd Ave. <input type="text"/> MI <input type="text"/> Last <input type="text"/> Degree (MD, MPH)									
Address 2: <input type="text"/> Suite 4A									
City: <input type="text"/> Detroit <input type="text"/> MI <input type="text"/> 42021 <input type="text"/> (313) 555-8823 <input type="text"/> Fax <input type="text"/> Email									
Dear Dr. Smith,									
<input type="text"/>									
IMPRESSION:									
<input type="text"/>									
Record: 16 of 1 1 of 1 (Filtered)									

264

Fig. 25

266

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.:

/ Atty. Docket No.: MTS 0102 PUS

23/25

Print Request

Patient: Doe, John|

SSN: 123-12-1234

Close

Visit Selected: 01/03/1999

Print Menu

Preview

PDF

Print

Patient History

Review of Systems

Preventive Health / Sleep Apnea

Current Meds Only

Full Medicine List

Visit Vitals / Problems / Complaint

Physical / Impression / Plan

Diabetes Care

Secondary Hypertension Summary

BioZ (plethysmography)

MedTrace Calculated Comments

Print Thank You Letter for Referring Doctor

Print Visit Reports

Fig. 26

268

272

Title: COMPUTER-IMPLEMENTED METHOD AND SYSTEM FOR MANAGING PATIENT
HEALTHCARE AND EVALUATING PATIENT KIDNEY FUNCTION

First Named Inventor: John M. Flack

Application Serial No.: / Atty. Docket No.: MTS 0102 PUS

24/25

MedTrace

File Edit Insert Records Window Add To List Medication Table Treatment Algorithms View Summary Help

Physician Directory

First Name	John	Date
Middle Initial	M	
Last Name	Flack	
Degree	MD, MPH	
Address	University Health Center	
Address2	4201 St. Antoine, Suite 4C	
City	Peoria	
State	IL	
Zip	61620	
Telephone	(313) 956-0635	
Fax Number	(313) 749-5555	
E-Mail	jflack@unimed.wayne.edu	

Records: 11 | 4 | 26 | 11 | 1 of 95

274⁺ Fig. 27

25/25

Clinical Administrative Report

REPORT PARAMETERS

Physician Provider

- ☐ All
- ☐ Physician A
- ☐ Physician B
- ☐ Physician C
- ☐ Physician D

Age (Years)

thru

- ☐ All Ages

Time Period

thru
month month

thru
year year

Race/Ethnicity

- ☐ All Race/Ethnic Groups
- ☐ White
- ☐ African American
- ☐ Hispanic
- ☐ Native American
- ☐ Asian/Pacific
- ☐ Other

Report Variables

- ☐ % Visits at or Below JNC-VI
- ☐ % Attaining Goal BP
- ☐ Average # of Follow-Up Visits
- ☐ Average Number of Baseline Hypertensive Medications
- ☐ Average # Number of Follow-Up Anti-Hypertensive Medications
- ☐ Average Pre-Treatment Blood Pressure
- ☐ Average Blood Pressure Reduction From Baseline

Sex

- ☐ men ☐ Women
- ☐ Both

Fig. 28

276 ↗